

## CLAIMS

What is claimed is:

- 1 1. A system for lapping a head, comprising:
  - 2 (a) a wafer including at least one head each having an electrical lapping guide (ELG),  
3 a plurality of wafer contacts in electrical communication with the ELG, and a  
4 closure formed thereon defining a slot in which the wafer contacts are positioned;
  - 5 (b) a lapping cable coupled to a testing device, the lapping cable including a plurality  
6 of lapping cable contacts; and
  - 7 (c) an adapter including a plurality of adapter contacts in electrical communication  
8 with the lapping cable contacts;
  - 9 (d) wherein the adapter contacts are removably positionable in electrical  
10 communication with the wafer contacts during a lapping process.

- 1 2. The system as recited in claim 1, wherein the adapter is constructed from a  
2 polyimide material.

- 1 3. The system as recited in claim 1, wherein adapter includes a pair of holes formed  
2 therein for coupling with a pair of holes formed in the lapping cable via a pair of  
3 alignment pins.

1    4.    The system as recited in claim 1, wherein the adapter includes at least one guide  
2                 for being removably positioned in a slot defined by closures of adjacent heads  
3                 formed on the wafer.

1    5.    The system as recited in claim 1, wherein the adapter contacts are slidably  
2                 coupled to the adapter.

1    6.    The system as recited in claim 1, wherein the adapter contacts each include a first  
2                 portion in electrical communication with one of the lapping cable contacts and a  
3                 second portion in electrical communication with one of the wafer contacts.

1    7.    The system as recited in claim 6, wherein the first portion of each adapter contact  
2                 is larger than the second portion of each adapter contact.

1    8.    The system as recited in claim 7, wherein the first portion of each adapter contact  
2                 has a diameter larger than that of the second portion of each adapter contact.

1    9.    The system as recited in claim 6, wherein the adapter includes a recess for  
2                 preventing contact with the wafer during the lapping process.

1    10.   An system for lapping a head, comprising:

- 2 (a) a wafer including at least one head each having an electrical lapping guide (ELG),  
3 a plurality of wafer contacts in electrical communication with the ELG, and a  
4 closure formed thereon defining a slot in which the wafer contacts are positioned;  
5 and  
6 (b) a lapping cable coupled to a testing device, the lapping cable including a plurality  
7 of lapping cable contacts extending outwardly therefrom;  
8 (c) wherein the lapping cable contacts are removably positionable in electrical  
9 communication with the wafer contacts during a lapping process.

1       11. The system as recited in claim 10, wherein the lapping cable includes at least one  
2                  guide for being removably positioned in a slot defined by closures of adjacent  
3                  heads formed on the wafer.

1       12. The system as recited in claim 10, wherein the lapping cable contacts extend in a  
2                          direction perpendicular with respect to the lapping cable.

1       13. The system as recited in claim 10, wherein the lapping cable includes a recess for  
2 preventing contact with the wafer during the lapping process.

1 14. An apparatus for use with a wafer including at least one head each having an  
2 electrical lapping guide (ELG), a plurality of wafer contacts in electrical  
3 communication with the ELG, and a closure formed thereon defining a slot in  
4 which the wafer contacts are positioned, and a lapping cable coupled to a testing

5 device, the lapping cable including a plurality of lapping cable contacts; the  
6 apparatus comprising: an adapter including a plurality of adapter contacts in  
7 electrical communication with the lapping cable contacts, wherein the adapter  
8 contacts are removably positionable in electrical communication with the wafer  
9 contacts during a lapping process.

- 1 15. An apparatus for use with a wafer including at least one head each having an  
2 electrical lapping guide (ELG), a plurality of wafer contacts in electrical  
3 communication with the ELG, and a closure formed thereon defining a slot in  
4 which the wafer contacts are positioned, the apparatus comprising:
- 5 (a) a lapping cable coupled to a testing device, the lapping cable including a plurality  
6 of lapping cable contacts extending outwardly therefrom in direction  
7 perpendicular with respect to the lapping cable;  
8 (b) wherein the lapping cable contacts are removably positionable in electrical  
9 communication with the wafer contacts during a lapping process.

- 1 16. An adapter including a plurality of adapter contacts in electrical communication  
2 with a plurality of lapping cable contacts of the lapping cable, wherein the adapter  
3 contacts are removably positionable in electrical communication with a plurality  
4 of wafer contacts of a wafer during a lapping process.

- 1 17. A lapping cable coupled to a testing device and including a plurality of lapping  
2 cable contacts extending outwardly therefrom in a direction perpendicular with

3 respect to the lapping cable, wherein the lapping cable contacts are removably  
4 positionable in electrical communication with a plurality of wafer contacts of a  
5 wafer during a lapping process.

1 18. An adapter including a plurality of adapter contacts in electrical communication  
2 with a plurality of lapping cable contacts of the lapping cable, the adapter further  
3 including at least one guide for being removably positioned in a slot defined by  
4 closures of adjacent heads formed on the wafer, and a recess for preventing  
5 contact with the wafer during the lapping process, wherein the adapter contacts  
6 are removably positionable in electrical communication with a plurality of wafer  
7 contacts of the wafer during a lapping process.

1 19. A method for testing during a lapping process, comprising:  
2 (a) providing an adapter including a plurality of adapter contacts in electrical  
3 communication with a plurality of lapping cable contacts of the lapping cable;  
4 (b) removably positioning the adapter contacts of the adapter in electrical  
5 communication with a plurality of wafer contacts of a wafer;  
6 (c) lapping a surface of the wafer; and  
7 (d) measuring a head of the wafer during the lapping process.